

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:
Suzuki, et al.

Serial No.: 10/004,489

Confirmation No.: 9428

Filed: October 23, 2001

For: Method of Forming Film, Method
of Manufacturing Semiconductor
Device and Film Forming
Apparatus

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Group Art Unit: 2818

Examiner: Renee R. Berry

Mail Stop Issue Fee
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Dear Sir:

CERTIFICATE OF FACSIMILE TRANSMISSION UNDER 37 CFR 1.8	
I hereby certify that this correspondence and the documents referred to as attached therein are being facsimile transmitted to the U.S. Patent and Trademark Office to the fax number indicated by the Examiner, namely, fax number (703)-872-9306 to the attention of the named Examiner, on the date below.	
<u>1/13/04</u> Date	<u>[Signature]</u> Signature

COMMENTS ON STATEMENT OF REASONS FOR ALLOWANCE

In the Notice of Allowance mailed December 5, 2003, the Examiner states that there is no prior art of record that teaches or suggests a method of depositing a halogen-doped silicon oxide over metal lines by using gas mixtures having $\text{SiF}_4:\text{SiH}_4$ ratios of 0.0 to 1.0. Applicants note that the claim 1 of the allowed claims recites a flow rate ratio of SiF_4 to SiH_4 of larger than 1, rather than a $\text{SiF}_4:\text{SiH}_4$ ratio of 0.0 to 1.0. Applicants submit that the references of record do not teach, show, or suggest a deposition method of forming a silicon inorganic insulating film on a substrate, comprising placing a substrate in a semiconductor manufacturing apparatus having parallel plate type electrodes, and depositing a fluorine-containing silicon insulating film on the substrate by generating a plasma of a process gas containing SiH_4 , SiF_4 , and an oxygen source substance, wherein a flow rate ratio of said SiF_4 to said SiH_4 into the

semiconductor manufacturing apparatus is larger than 1, as recited in claim 1.

Respectfully submitted,



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